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RESPONSE UNDER 37 C.F.R. § 1.116
EXPEDITED PROCEDURE
GROUP 2874
PATENT APPLICATION

AF/2800
#4
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8-903

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re application of

Docket No: Q64035

Martin KOWATSCH

Appln. No.: 09/832,827

Group Art Unit: 2874

Confirmation No.: 1954

Examiner: Sung H. PAK

Filed: April 12, 2001

For: OPTICAL WAVEGUIDE STRUCTURE AND METHOD FOR PRODUCING SUCH A
WAVEGUIDE STRUCTURE

RESPONSE UNDER 37 C.F.R. § 1.116

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Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

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TECHNOLOGY CENTER 2800

Sir:

In response to the Office Action dated May 9, 2003, please consider the remarks as
submitted herewith on the accompanying pages.

REMARKS

Information Disclosure Statement:

Applicant thanks the Examiner for initialing and returning the Form PTO-1449 filed on
August 8, 2002, thus indicating that all of the references listed thereon have been considered.

Claim Rejections:

35 U.S.C. § 103(a) Rejection - Claims 1-5 and 7-11:

Claims 1-5 and 7-11 stand rejected under 35 U.S.C. § 103(a) a being anticipated by U.S. Patent No. 5,943,455 to Travieso et al. in view of the Ehrfeld article. In view of the following discussion, Applicant respectfully disagrees.

As an initial matter, Applicant notes that the Travieso reference has little or no relevance to the present invention, and as such Applicant submits that the above referenced combination of references fails to teach or suggest the present invention.

Applicant notes that Travieso is directed to the use of an optical application specific integrated circuit (OASIC) 10 mounted on a substrate. The use of optical integrated circuits, as set forth in Travieso is used for small dimension, high integration technology for microscopic optical structures. In fact, this is similar to semiconductor integrated circuits. Further, Applicant notes that OASIC's are typically made of silica on silicon or lithiumniobate, or similar material (e.g. GaAs or InGaAsP for active optical components).

However, Applicant notes that waveguide structures, such as the present invention, are commonly considered macrotechnology regarding optical transmission. Optical waveguide circuit boards are generally used to connect optical components and use optical polymers poured into troughs, such as the present invention. This is completely different from the technology disclosed in the Travieso reference. Because of this distinction, Applicant submits that one of ordinary skill in the art would not, and could not, combine Travieso's OASIC technology with the polymer waveguide technology discussed in Ehrfeld, because of the large variance in dimensions between the two technologies. It is noted that one of ordinary skill in the art would

not increase the dimensions of the Travieso OASIC structure because its goal is to be as small as possible, and the normal fibers of Ehrfeld can not be reasonably reduced in size to be properly connected with the OASIC structure in Travieso.

Stated differently, for the same reasons that one of ordinary skill in the art would not introduce macroscopic copper wires to a semiconductor integrated circuit, one of ordinary skill in the art would not attempt to use the disclosure of Ehrfeld with the disclosure of Travieso.

Additionally, Applicant notes that that Travieso has no comparable waveguide structure to the present invention. Specifically, the fibers in Travieso do not form part of a common waveguide structure on the substrate, but are essentially loose fibers. Moreover, Applicant notes that Ehrfeld addresses only the attachment of external fibers to a substrate, but provides no disclosure of using fibers forming an integral part of a waveguide structure on a substrate, as taught by the present invention.

In view of the foregoing, Applicant submits that the above cited references fail to teach or suggest each and every component of the present invention, nor is there any motivation or suggestion to combine the cited references. In fact, Applicant submits that Travieso and Ehrfeld disclose two completely different aspects of optical technology, which can not be combined as suggested by the Examiner. Therefore, Applicant respectfully submits that the Examiner has failed to establish a *prima facie* case of obviousness, and hereby requests the Examiner reconsider and withdraw the above 35 U.S.C. § 103(a) rejection of the above claims.

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U.S. Application No. 09/832,827

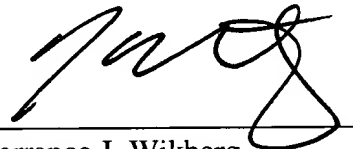
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Conclusion:

In view of the above, reconsideration and allowance of this application are now believed to be in order, and such actions are hereby solicited. If any points remain in issue which the Examiner feels may be best resolved through a personal or telephone interview, the Examiner is kindly requested to contact the undersigned at the telephone number listed below.

The USPTO is directed and authorized to charge all required fees, except for the Issue Fee and the Publication Fee, to Deposit Account No. 19-4880. Please also credit any overpayments to said Deposit Account.

Respectfully submitted,



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PATENT TRADEMARK OFFICE

Date: July 30, 2003